- Data analytics
- From data to information
- Digital business models

Business Intelligence – At the Heart of the Consumer

Digital technology has thoroughly changed communication between companies and consumers. Mobile devices are ubiquitous and the Internet of Everything is expontentially increasing the masses of data created. Business Intelligence (BI) helps companies to transform raw data into useful information.

Data Centers – the Backbone of Digitization

Industry 4.0, the Internet of Everything (IoE), cloud computing, online shops and music and video streaming services have become indispensable in our everyday lives as products of the digital age. In addition, we are also seeing more and more digital ecosystems at the corporate level that enable companies in different industries to network. Connected cars are a good example. Here, automakers and IT giants will be working together as partners on connecting the smartphone with the electronics inside the vehicle.

But digital ecosystems are also forming inside data centers. They provide a digital marketplace for connecting customers with one another as well as with carriers and other service providers, and enable the provision of services via cloud-based applications. This opens up new possibilities for interaction and value creation for all parties involved.

Thanks to their high-performance infrastructure – optimized to meet current demand – data centers provide the basis for successful digitization applications and strategies. By 2020, data centers are expected to take over the role of economic engines and form the foundation for the digital society.

As one of the world's most interconnected digital hubs, Frankfurt generates impetus for growth in Germany. Due to the presence of a multitude of network operators in the area and its proximity to the core infrastructure of the world's largest internet exchange node DE-CIX, Interxion has recently established one of Germany's largest cloud centers at its data center campus in Frankfurt/M. Various market players from a single industry are setting up operations to form a digital community and to exchange data across the shortest distances with low latency and excellent connectivity in accordance with the German data protection laws.

Data centers provide the basis for successful digitization applications and strategies

Peter Knapp
Managing Director
Interxion Deutschland GmbH
www.interxion.com

Many companies based in Germany are reluctant to store their sensitive data in the cloud. More and more data center providers are therefore offering their customers direct, secure connections to different cloud platforms without having to use the public internet.

Digitalization is driving demand for data center services: Data throughput at the DE-CIX alone is doubling every year, and IT trends will continue to drive this trend in the future.

Today, data center providers are not only responsible for continuously investing to expand their current capacities. They also strive to provide energy-efficient, cost-effective and more secure technologies and services that meet the digital needs of the future and establish digital ecosystems. ■

Data Analytics – Developing New Banking Solutions

Data Analytics encompasses the processes of accessing, inspecting, cleaning, assessing and modelling raw data to discover information. Analytics is nothing new for ING, the bank has been working with it for many years, mainly in risk, fraud prevention and marketing. Every day, terabytes of information are created and stored across the ING network. And while keeping this secure remains a top priority, ING has just started thinking about how data analytics can be used to develop services for customers helping them to stay ahead in life and business.

Current data can show customers their past transactions. This is like looking into a rear mirror. But the data also holds the possibility to look forward, for example by informing customers what their upcoming transactions are so they can better manage their money.

As data analysis processes become more sophisticated, access to and the quality of data is increasingly important. To tap into this field, ING is investing in its analytical capabilities. The new approach will create uniform data governance across the organization, as well as consistent definitions, measurements, policies and processes. Additionally the bank is setting up a data lake as a central repository for all internal and external data with the purpose of better data management and data quality assurance.

Data analytics is used to develop services for customers helping them to stay ahead in life and business

Roland Boekhout
CEO
ING-DiBa AG
www.ing-diba.de

As ING operates in many countries, the bank needs to accelerate development, standardizing approaches to expand them to other countries. So in addition to improving everything in relation to the data, the bank is also enhancing its customer intelligence capabilities by improving and standardizing the data model, the analytical tooling, model development and knowledge.

Another area is advanced analytics. New innovative services build on the new possibilities that technology and data analytics methods have to offer. For this purpose, ING has just recently set up an advanced analytics department. Its purpose is to support business units with knowledge and skills in machine learning and big data technology as well as to promote knowledge transfer and innovation across the organization.

All of these actions support the bank's strategic priority to provide the high-quality information and advice customers need so they can make better informed financial decisions. ■

Big Data – Getting in Shape for Digital Transformation

"You have to know the past if you want to shape the future." This is a mantra often heard from historians, and the basic principle that Business Intelligence (BI) originated from. Looking back is still important in a number of areas – knowing how a business has performed in the past remains an essential management tool.

However, conventional BI is struggling to keep up with the demands placed upon it in this era of digital transformation. Disruptive processes with unforeseen consequences demand new capabilities, and BI has reached the limits of what it is capable of. It needs to make room for a technology that can link historical data to real-time information, aggregate internal and external data in large quantities, and analyze that data in a way that lets us look not only back to the past, but on into the future as well. That technology is already here, and it is called big data analytics.

Big data analytics, put simply, is the ability to understand and make use of big data. It is one of the keys to mastering the digital transformation. But many companies are still having a difficult time with it because big data requires thinking and actions that stand in opposition to the way enterprises have traditionally grown. Most managers prefer evolutionary transition, not a sudden revolution.

But the revolutionary change in how we use and analyze data has already begun. Now the time has come to implement it. What is needed is a link between these 'old' and 'new' worlds, a space that allows companies to experiment with big data in a protected environment.

The Big Data Lab offers a foundation for companies to create new types of organizational structures and processes

Wolf Lichtenstein
CEO DACH Region, SAS
SAS Institute GmbH
www.sas.de

The Big Data Lab is just such a space, making it possible to quickly and easily test ideas, or even develop entirely new business models. It is something of a training center for disruptive thinking – there are no predefined business cases here. The goal is not to develop completely airtight solutions. The Big Data Lab offers a foundation for companies to create new types of organizational structures and processes they will need if they want to be ready for digital-first markets.

The situation is also a historical opportunity for CIOs. Traditionally operating within narrow constraints of translating specific business cases into IT solutions, the pressure to digitize has given CIOs a completely new frame of reference for driving business success. A unilateral approach won't work anymore. CIOs need to close ranks and align with their CEOs, and other parts of the organization – and the reverse is equally true. ■